

25X1A

CENTRAL INTELLIGENCE AGENCY

INFORMATION REPORT

COUNTRY Germany (Soviet Zone)

DATE DISTR. 21 Apr 52

SUBJECT Soviet Artillery

NO. OF PAGES 5

PLACE ACQUIRED

NO. OF ENCLS.
(LISTED BELOW)

DATE ACQUIRED

SUPPLEMENT TO
REPORT NO.

DATE OF IN

THIS DOCUMENT CONTAINS INFORMATION AFFECTING THE NATIONAL DEFENSE OF THE UNITED STATES, WITHIN THE MEANING OF TITLE 10, SECTION 283 AND 10 U.S.C. CODE, AS AMENDED. ITS TRANSMISSION OR REVELATION OF ITS CONTENTS TO OR ACCEPT BY AN UNAUTHORIZED PERSON IS PROHIBITED BY LAW. THE REPRODUCTION OF THIS FORM IS PROHIBITED.

THIS IS UNEVALUATED INFORMATION

25X1A

SOURCE

25X1X

25X1X

Doctrine and Command Channels for Artillery

1. The "Artillery Manual" issued by Supreme Artillery Academy (Vysshaya Artilleriskaya Akademiya), Moscow, 1949, prescribes tactics and techniques for artillery. I have seen and read this book [redacted]
2. [redacted] I learned that artillery units from battery up, are placed under the command of the tactical troops which they support.
 - (a) An artillery battery may be placed under an infantry battalion or regiment as necessity demands
 - (b) An artillery battalion may be placed under an infantry regiment or division

CLASSIFICATION		SECRET/SECURITY INFORMATION							
STATE	NAVY	AEC	X	DISTRIBUTION					
ARMY	AIR	FBI	X						

SECRET /SECURITY INFORMATION

-2-

25X1A

- (c) An artillery regiment may be placed under an infantry division
- (d) In all cases, the CO of the tactical troops becomes the CO of the combined forces
3. In combat the next higher command above an artillery division would be corps or army. A separate artillery regiment in combat may be subordinated to an infantry division.
4. Artillery firing positions are selected and occupied according to terrain and are based on air and/or ground reconnaissance of possible enemy target locations. For example, AT guns are placed to cover only that terrain which is suitable for operation of tanks.
5. [REDACTED] 25X1X
 Indicates that the roads used by Soviet artillery are always secondary cross-country roads, through forests and mountainous terrain, with a grade up to 30 degrees. I never traveled on the autobahn or on main highways. The routes are reconnoitered by reconnaissance men (razvedchiki). The march order of a battalion is as follows: reconnaissance men, battalion headquarters and then gun batteries (the latter are always on the alert). Supply vehicles and guns are towed by Studebaker prime movers and travel in column at an interval of 30 meters between vehicles. Vehicles travel at maximum possible speed (up to 60 kms depending on terrain). I can give no details on point, flank or rear guard. A chemical officer is with battalion headquarters, and is alert for possible gas attacks. EM (usually ammo carries) are selected to guide traffic. If the column encounters impassable ditches or streams, the artillery men, themselves, and not the engineers, build rafts or makeshift bridges from trees.
6. Light artillery 57, 76 and 85 mm are in the front lines with tanks and infantry, both in offense and defense, in support of an attack, withdrawal or defense. Heavy artillery of 152 and 300 mm, mortars and rocket launchers are two to six kms behind the front line troops, and displace forward in conjunction with them. I never heard withdrawals discussed
- [REDACTED]
7. One gun of a battery will, before combat, fire three to four rounds to zero on a potential target and subsequently note the reference points. When the actual target is sighted, the command is given according to these reference points.

Example:

Rubezh (Terrain Line) 4
 Pritzel (Sight Marking) 30

All other guns of the battery close on the base weapon and fire is opened on the target.

8. Considerable detail is devoted to aerial survey and ground reconnaissance, but only high ranking officers know the exact technique, the time required to accomplish and the personnel who perform such surveys.

SECRET/SECURITY INFORMATION

SECRET/SECURITY INFORMATION

-3-

25X1A

25X1X

25X1X

9. I learned [redacted] that special firing charts in each battery show how to allow for wind, rain and other weather conditions. I do not know how much use is made of meteorological information or whether it is received from higher headquarters or if the battery CO, himself, judges the effect of the weather on accurate firing.
10. Only one gun of a battery unit will register on a target. The other guns will compensate by adding so many mills to the left or right, as the case may be.
11. Hostile batteries and mortars are located by aircraft, observers and reconnaissance patrols, and by plotting the trajectory of enemy shells. This information is then used to conduct counter-battery and counter-mortar missions.
[redacted] not well informed on exact details.
12. [redacted] that all Soviet artillery employs direct fire, (priyamaya navodka) whenever possible. During the latter part of World War II (1944 & 45), the Soviets found direct fire to be the most effective, and at present very little training is devoted to firing from position defilade.
13. Soviet tank guns and light artillery are used as supplemental artillery, in that they are always employed as direct support weapons.
14. In combat imitation guns are set up, partly camouflaged, while the real batteries are heavily camouflaged. I have never heard of harassing fire and believe that it is not employed by Soviet artillery. Soviet artillery will zero on a given point and open fire only when hostile units are actually within the target area. In connection with this subject, an actual battle film of the war in Korea was shown to Soviet artillery troops in the fall of 1951. In the film a US gun battery fired a harassing mission. After the battery moved on, the North Koreans came out of concealment and continued their march. Soviet officers and EM laughed at this because it was contrary to Soviet practice. Soviet artillery would not have moved on until the assigned mission (which would have been to wipe out the concealed North Koreans) had been accomplished. If the conditions permit, reinforcing artillery will move into position areas the night before a contemplated attack, so as to have time for observation and camouflaging. (Including rocket artillery and mortars.) Artillery commences firing about one-half hour prior to an attack. Besides artillery, mortars, AT guns and rocket launchers are employed in pre-attack fire. I believe the tactical air effort is coordinated with that of the artillery, prior to an attack, but can give no definite data.

Fire Control Procedures

15. The manual mentioned in 1., above, governs methods and techniques of adjustment and control of fire.
16. The division artillery officer of the CO of a tank, rifle or mechanized division, or of an artillery unit of regimental size, decides what targets to fire upon, how many rounds and guns are to be employed and what ammunition will be used against a particular target. Difficult decisions may be made by the artillery officer of an army.

SECRET/SECURITY INFORMATION

SECRET/SECURITY INFORMATION

-4-

17. I have no knowledge concerning fire direction centers.
18. Firing charts are for peacetime training only. In actual combat, the fire must be immediate, and the gun commander blankets fire on the target in hopes of obtaining a few direct hits.
19. I have never heard of a topography platoon. The intelligence platoon performs reconnaissance and corrects fire.
20. In all training utmost speed in delivery of fire is stressed. A battalion CO brings all guns of his battalion simultaneously on the same target by calling battery CO's on the telephone or radio. I believe that from the time a target is reported a platoon will fire within 60 to 90 seconds, a battery within three to five minutes and a battalion within five to seven minutes. I have never heard of TOT fire and to the best of my knowledge this method is not employed by Soviet artillery. The Soviets employ massed fire, ie intermittent blanket firing.
21. I do not know if more than one battalion fires simultaneously on a target of opportunity.

System of Forward Observers

22. I believe that a forward observer is not limited to his assigned zone, but will report the location of a target outside that zone to the forward observer in whose area the target appears. These two forward observers will then decide between themselves which artillery unit can fire most effectively on the target. There is definite liaison between forward observers. Positioning of forward observers and observation posts are selected for good visibility and for concealment from enemy observation. A platoon forward observer controls the fire of two guns. A battery or battalion observer controls all guns of his respective unit; however I have no knowledge on the maximum number of guns a forward observer may control. Forward observers are assigned to the use of outstanding terrain features which are called reference points (orientirovki). I have no definite knowledge as to what data is reported by a forward observer, but I have seen that the forward observer reported his observations to the platoon CO. Forward observers, as far as I have seen, vary in rank from Private to NCO, depending on whether they are assigned to battery, battalion, regiment, division or army. A forward observer does not function alone but always has a telephone and/or a radio operator. He may also have a runner. These men are NCO's or privates.

Communications

23. Supported troops request fire on a particular target by phone or radio through the tactical commander to the supporting artillery. I believe radio or telephone communication is maintained from battery level up, but am not certain. Forward observers communicate with their units by radio or telephone. I do not know if a forward observer communicates with the supported unit or with other echelons.

SECRET/SECURITY INFORMATION

-5-

Organization and Equipment

24. I believe that on division level and above, the unit commander can get liaison and/or observation aircraft but do not know if they are always assigned to these units.
25. I am familiar with the 57 mm AT gun. Weight of weapon in traveling position: 1250 kg; in firing position: 1150 kg. The maximum effective range is considered to be 800 meters; best results are obtained at ranges of 300 to 500 meters. Total weight of the shell is 6.8 kg. Weight of the explosive in shell is approximately 600 grams. There are no changes or zones in the propellant. A 122 mm howitzer weighs three tons; the shell, 23 kg.
26. I was shown [redacted] projectiles APHE, AP capped, AP Cap Ballistic Cap and HVAP Composite Rigid (Arrowhead) as types of ammunition available for the 57 mm AT gun.
27. The RVAF Composite Rigid (Arrowhead) projectile is known by the Soviet terminology "podkalibernyl Snaryad", (Subcaliber shell). The shell was first introduced at the end of 1944 and was used with great effectiveness against German tiger tanks. The 57 mm subcaliber shell has a total weight of approximately 6.8 kg. The projectile itself weighs approximately three kg. Inside the soft nosed projectile is a core of wolfram. The projectile has a velocity of 1270 meters per second and will penetrate 20 cm (eight in) of armor at a range of 300 to 500 meters on a direct hit. Angle hits will ricochet. I have never fired a 57 mm "subcaliber shell" but while assigned to an AT Battery of a Motorized Rifle Bn, 65th Gds Ry Tk & Sp Regt, I actually saw these shells. The unit of fire for a 57 mm AT gun was 240 rounds, of which 10 were "subcaliber".
28. The following ammunition is available for 76, 85 and 100 mm guns: fragmentation/HE, and AP.
29. Anti-tank ammunition is provided for 57, 76, 85 and 100 mm guns. I can supply no additional details regarding ammunition other than that given in the preceding paragraph.
30. During WW II (1945) the Soviets developed delayed action fuses MD seven and MD eight (minibrannoye devistviye). These fuses are attached to fragmentation/HE projectiles and are used against pill boxes and machine gun nests. [redacted] but have never fired projectiles equipped with them. I have no further information on these fuses. I was shown fuses [redacted], but could not identify any of them as being currently used by the Soviets. Standard fuses are made of steel, either point detonating (similar to KTN-1) or delayed action.

SECRET/SECURITY INFORMATION

SECRET/SECURITY INFORMATION